ance. It had a more opaque white, or cream colour, something like lymph in the neighbourhood of an abscess, and was composed, apparently throughout, of well formed cells, larger, clearer, and less granulated, than pus cells, with distinct nuclei. This cream-coloured portion of the clot was, in the right auricle, separated by a defined line from the remaining buff-coloured part, and could easily be peeled off from it. It had not quite a smooth external surface, and adhered slightly to the interior of the cavity, particularly in the appendix; nevertheless, it remained with the clot when the latter was turned out of the auricle. In the ventricles it adhered to the lining membrane of the heart more closely than in the auricles, especially about the edges of the valves, and near the apex. Where the clots extended into the pulmonary artery and aorta, they were deeply impressed by the sigmoid valves; but were not adherent to them.

Near the bifurcation of the pulmonary artery the whole thickness of the clot had a dull cream colour, and this was the case in the primary divisions of the vessel. In no place were the clots adherent to the walls of the pulmonary artery. Fibrinous strings, presenting the usual appearance, extended into the smaller branches of the artery.

In the inferior cava and the iliac veins was some fluid blood, which coagulated on exposure to the air; and mingled with it were numerous small clots, coloured in different degrees, and some of them partycoloured. They appeared to be free in the fluid blood, or, if adherent to the walls of the vessels, their connexion was very slight. In the great veins which converge to the superior cava, the clots were more numerous, larger, and more fibrinous, but still loose in the tubes, or very slightly connected with their walls. The left jugular and subclavian veins, at and near their junction, were almost filled by yellowish or cream-coloured clots, having a peculiar coiled or wrinkled exterior, which must have been caused by their being subject to some movements during the flow of the blood, or to their having been formed or increased by smaller clots carried in the current from other parts, and intercepted there. None of the vessels were distended by the clots.

In all the arteries which I examined, except the aorta and pulmonary arteries, the blood was fluid. The heart itself was quite sound, and there was no disease of the internal organs.

I have seen other cases more or less similar. In none of them, however, did the symptoms and the appearances after death so clearly indicate that death had been caused by the clotting of the blood in the cavities of the heart and in the adjacent great vessels. They form a highly important class of cases, to which the attention of pathologists and practical men is being more and more closely directed, and for the clear appreciation and discrimination of which much information as to the causes influencing and regulating the coagulation of the blood within the body, before and after death, has yet to be sought. At present, I think we are unable to explain many of the appearances we are in the habit of observing, and of deciding with certainty whether they are to be referred to *post mortem* changes, or whether they commenced during the life of the patients. For instance, we often find the cavities of the heart (the right auricle and ventricle more particularly, the left ventricle not unfrequently, the left auricle rarely) filled with fibrinous clots, and the prolongations of the clots extending into the adjacent vessels and descending into the most dependent branches of the pulmonary arteries; so that the absence of colour in them does not admit of explanation upon the ordinarily received hypothesis of the subsidence of the red corpuscles during the slow coagulation which goes on in the recently dead body, because the lowermost portions of the clots in the several cavities, and the most dependent portions in the pulmonary arteries, are as devoid of colour as the uppermost parts. Nevertheless, it seems pretty certain that clots of this kind are, for the most part, formed after death. Coincident with these fibrinous clots is sometimes a variable amount of fluid blood, which may be in the same cavities as the clots; commonly there is some fluid blood in the left auricle. Not unfrequently the clots extending from the ventricles into the pulmonary artery and the aorta exhibit well marked impressions of the semilunar valves, showing clearly that they were moulded upon the valves; and this is regarded as evidence of their having been formed before death (Richardson *On the Coagulation of the Blood*, pp. 407 and 420). Yet these clots are almost invariably found not adherent to the valves, but quite free from them and smooth. Moreover, each one commonly bears the impression of each of the three valves in an equal degree; and this often happens on both sides of the heart in the same body. If, therefore, these clots formed, as is supposed, or commenced, before death, upon the valves, they must have lined the whole of the interior of the vessels at and near their connexion with the heart, and must have completely covered and impeded the action of all the semilunar valves in such a manner and to such an extent that it would scarcely have been possible for the circulation of the blood to have been continued at all.

I think that additional observations upon the coagulation of the blood in the dead body, under varying circumstances and after various diseases, must be made before we can agree with the author of the excellent work *On the Coagulation of the Blood*, that either the tubular or the laminated structure of a clot, or the fact of a clot consisting of a fibrinous tube containing red blood in its interior, is conclusive evidence of the coagulation having begun before death. Lamination is a singularly prevalent and remarkable feature in the inorganic, as well as in the organic world; and the circumstances under which it occurs and the causes which induce it would prove a fertile subject for study and experiment. It is doubtless more commonly observed in those clots which, there is good reason to believe, have formed before death, than in those which have commenced subsequently. It would seem to depend upon the deposition of the fibrine in successive layers; though that is not certain, inasmuch as it may depend upon some peculiarity in the manner of the solidification of the fibrine, the particles becoming disposed in plates and layers, just as we know they have a disposition to be arranged in fibres; and it is no unreasonable supposition that this may, under favourable circumstances, take place after death. With regard to the tubular form of a clot, it is by no means improbable that, in certain peculiar conditions of the blood, the tendency of the fibrine to separate itself and settle upon the walls of the vessels, on the valves, and on other structures, may be manifested after death, in the same way that it often is before death; and may thus lead to peculiarities in the appearance and structure of the clot which render it very difficult, or impossible, to distinguish whether they are *ante* or *post mortem* formations.

The mode in which the *fibrinous* and the *corpuscular* varieties of the fibrine are combined in the same heart, or even in different parts of the same clot, are difficult of explanation. Thus in a lad, who died with cerebral symptoms after amputation, I found in the right auricle and ventricle a firm white clot, which presented, under the microscope, a distinctly fibrous structure, the fibres being clear and delicate, but strong; and in the left ventricle were small reddish clots, containing an unusual quantity of pale nucleated corpuscles. When the two varieties coexist in the same clot, the fibres generally preponderate at the circumference, and the corpuscles nearer the centre: the reverse, however, was found in the clots occupying the heart in the case above related.

CASE OF POISONING BY SIR WM. BURNETT'S DISINFECTING FLUID: RECOVERY.

By Henry Porter, M.D., Peterborough.

I was summoned at six o'clock on the morning of February 26th, to go five miles into the country, by a message to the effect that "Mr. F. had swallowed something by mistake, which had made him very sick and ill," but with no more definite statement. I therefore at once proceeded to visit my patient; and, on inquiry, found that he had returned home late on the previous evening from a dinner party, when, according to custom, he had gone to a cupboard where a bottle of Dinneford's Fluid Magnesia was usually kept, for the purpose of taking a dose, as a corrective to his port-wine. Unfortunately, however, on the present occasion, a bottle of Sir Wm. Burnett's Disinfecting Fluid had been placed by the side of the fluid magnesia, resembling it so much in size, shape, and colour of the label, that he at once put it to his lips, threw his head back, and, taking a full inspiration, swallowed a draught, amounting at least to two ounces, before perceiving the mistake. "At once," says my patient, "I felt a burning sensation all down my throat, with great pain and a sense of tightness in my stomach. My wife directly prepared me an emetic of mustard and water; and in less than four minutes I was violently sick, ejecting all the food I had taken, as well as the fluid I had swallowed; and I have been in excessive pain up to the present time": which was about seven o'clock A.M. when I first saw him.

He then had that particularly anxious expression of countenance indicative of irritant poisoning, with a small, quick,

and feeble pulse, and cold clammy skin. The back part of the mouth and fauces were much inflamed, but free from swelling or disintegration of surface, and the slightest pressure over the region of the stomach caused great increase of pain, with tendency to vomit.

I prescribed fifteen grains of carbonate of soda, to be given every hour in a wineglass of water, with total abstinence from food or other drink, and perfect rest in bed.

In the afternoon of the same day, I revisited my patient, accompanied by Dr. Paley of Peterborough. He was much in the same state as when I left him, except that the pulse was more feeble and the surface colder. He had continued to vomit at intervals large quantities of mucus, mixed with a considerable portion of dark coloured blood. He was then ordered ten grains of carbonate of soda with six drops of Battley's solution of opium in water every three hours, with total abstinence from food or drink, and warm fomentations to the abdomen.

Feb. 27th. He passed a restless night, but with a diminution in the amount vomited; the matter being darker and more grumous. The pulse had slightly improved in force, and there was more warmth of surface, but much pain over the region of the stomach. The tongue and mucous membrane of the fauces had assumed a milk white appearance. He was ordered to continue the medicine every four hours, and take half an ounce of castor oil; his diet being limited to milk and water.

Feb. 28th. He passed a comfortable night without much vomiting; the matter being only slightly tinged with blood. The pain of the hypochondrium had considerably diminished, and his countenance had lost much of its anxiety. He had passed a copious evacuation, of a dark colour; the greater part of which was evidently altered blood.

From this date to March 8th, the symptoms gradually subsided; the only alteration in medicine being the omission of the opiate and the use of infusion of cusparia with alkali. He had commenced to take solid food, and drink beer, contrary to my wish; and on March 8th, diarrhœa set in, which was at first exceedingly obstinate, but yielded in the course of a week to gallic acid and sedative solution of opium.

March 20th. He left home for the Isle of Wight; and after three days, wrote to me, complaining of inability to swallow his food. I therefore advised his speedy return.

March 26th. I saw him again, and examined his throat, but found no stricture whatever, and soon discovered that the symptom was entirely a nervous one. I ordered him to abstain from all solid food, but to take the most nutritious liquids, prescribing the mineral acids with bitter infusion three times a day. He continued this plan until April 20th, being then free from all complaints, and gradually resuming his accustomed food and active occupation.

I met my patient a few days since, when he declared himself well in all respects, and free from even the least discomfort after meals, having quite resumed his natural robust appearance and active habits.

Remarks. On reviewing this case, I consider it almost miraculous that my patient should have escaped after taking so large a quantity of such a noxious poison, amounting (according to Dr. Pereira) to more than six drachms of chloride of zinc; and can only attribute his recovery to the full state of the stomach at the time, and the speedy removal of the poison by the domestic emetic. With regard to the drug employed as an antidote, as I do not look upon the stomach as a purely chemical laboratory, I will not presume to say that the carbonate of soda acted by converting the chloride into a carbonate of zinc; but most certain it is, that its administration proved most beneficial; and I would earnestly recommend its use in any similar catastrophe. Since such a close resemblance exists between the bottles and labels in which these two highly useful and much used preparations are supplied to the public, I greatly fear that such a misadventure is very liable to recur—this not being the first case of the kind which has come before the public. I believe that, if means could be adopted to render poisonous articles in general more conspicuous by each one having some peculiar form in which it only could be retailed, the sale of them would be fraught with much less danger than is at the present time unluckily the case.

In justice to my patient, I may state, that he is invariably an abstemious man, and when the accident occurred was perfectly sober. I may also mention the coincidence, that his mother swallowed a large quantity of liquor potassæ, and died, after dragging out a miserable existence for two years from stricture of the œsophagus.

Transactions of Branches.

LANCASHIRE AND CHESHIRE BRANCH.

STONE IN THE BLADDER OF A FEMALE: FISTULOUS OPENING FROM THE BLADDER INTO THE LEFT GROIN: OPERATION: RECOVERY.

By William McEwen, M.D., Chester.

[*Read June 8th*, 1859.]

I am indebted to my friend Mr. J. E. Moreton, of Tarvin, near Chester, for the following report.

"Miss M. M., aged 24, in the middle ranks of life, came under my observation on the 19th of May, 1858.

"When a child, she had disease in the right hip-joint, which is now ankylosed in a slightly flexed position, causing the leg to be shorter than its fellow, and giving a lame gait in walking. Upon the whole, she has never enjoyed good health, but cannot give any well defined or specific account of her ailments, which have rendered her weak and delicate-looking.

"She evidently avoided in any way alluding to her sufferings, which must have been present, more or less, for some years; for I remember casually calling her attention to any pain or difficulty she might have had in passing urine.

"When I first saw her (May 19th, 1858), she had a small abscess in the left groin, in the region of the superficial glands of the neighbourhood. The abscess opened spontaneously in a few days, presenting very much the character and appearance of a small scrofulous collection of matter, and was, indeed, so considered.

"Her health had suffered considerably; during the last few months she became much emaciated, with a quick feeble pulse, at 120; no appetite; indeed, she had a hectic appearance. Cod-liver oil with iodide of iron were administered internally; and iodide of lead was applied to the groin. Four days after the abscess opened, urine came out with the matter. I thought she might be mistaken; but, on careful examination, I found that such indeed was the case; and to satisfy myself as to the condition of the bladder, on the 5th of June I passed first an elastic catheter, then a silver catheter, through which no urine came, but which struck against a calculus of very large size, blocking up the bladder and internal meatus.

"Again and again I asked her whether she had any previous symptoms of disease of the bladder; but all I could glean from her was, that four years ago the same train of symptoms had accompanied the bursting of an abscess in the same groin; and that urine had then passed through the opening for some weeks, and then ceased of its own accord, leaving her in a very poor state of health."

These are the circumstances under which Mr. Moreton did me the honour to call me in consultation; and I must confess the general appearances of the patient were by no means favourable for an operation. There she lay, helpless, emaciated, hectic, with a pulse running upwards of 120 per minute: great pain along the region of the bladder; and all the urine, as it was secreted, passing through the sinus which Nature had made to the groin. The skin around the opening was red and tense, from the perpetual flow of urine; none apparently was passing, or had passed for some time, through the meatus, which was filled with pus from the bladder.

The patient was very pressing that something should be done to relieve her from pain and her loathsome condition. Upon carefully examining the bladder as far as it could be done, it became obvious from the position of the stone, and its great size, completely filling the bladder, which was much altered both in structure and position, that dilatation or crushing was impossible, leaving, as the only alternative, incision, which was performed on June 11th. She was placed on a mattress, and tied up in the usual manner, and chloroform administered. Mr. Moreton held a straight grooved staff, the point being in contact with the stone. With a probe-pointed knife I cut first a little laterally, and then downwards and outwards. The staff was then removed: the stone was gently but easily removed. This which I show you is a section of the first stone, which weighed two ounces *minus* thirty grains; its longest diameter is two inches, and it is one inch in thickness. I introduced my finger into the bladder, to ascertain if any portion had been left; and, to my surprise, found another stone, apparently as large as the one I had just removed; and the difficulty I had to get it raised from its bed was very considerable, for the bladder